

## ABSTRACT

A submount that enables the reliable mounting of a semiconductor light-emitting device on it, and a semiconductor unit incorporating the submount. A submount 3 comprises (a) a substrate 4; and (b) a solder layer 8 formed on the top surface 4f of the substrate 4. The solder layer 8 before melting has a surface roughness, Ra, of at most  $0.18 \mu\text{m}$ . It is more desirable that the solder layer 8 before melting have a surface roughness, Ra, of at most  $0.15 \mu\text{m}$ , yet more desirably at most  $0.10 \mu\text{m}$ . A semiconductor unit 1 comprises the submount 3 and a laser diode 2 mounted on the solder layer 8 of the submount 3.